

# Converting Colors

CIELCh(20, 51.071, 300.414)

Have a look what the booklet for  
CIELCh(20, 51.071, 300.414)  
contains.

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# Color

**CIELCh(20, 50.845, 300.348)**

# Conversions

## Conversions Part 1

<b>Format</b>	<b>Color</b>
Hex	262672
RGB	38, 38, 114
RGB Percent	15%, 15%, 45%
CMY	0.8521, 0.8518, 0.5539
CMYK	0.67, 0.67, 0.00, 0.55
HSL	240°, 50%, 30%
HSV	240°, 67%, 45%
XYZ	4.4985, 2.9891, 16.1858
YIQ	46.6640, -24.3960, 23.6360

# Conversions

## Conversions Part 2

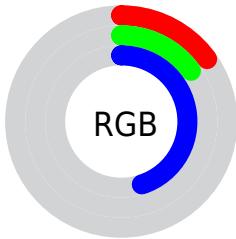
<b>Format</b>	<b>Color</b>
<b>RYB</b>	38, 38, 114
Decimal	2500210
CIELab	20.00, 25.69, -43.88
CIELCh	20, 50.845, 300.348
Yxy	2.9891, 0.1900, 0.1263
Android (android.graphics.Color)	4280690290 (0xFF262672)
YUV	46.6640, 33.1966, -7.5983
Hunter-Lab	17.2889, 16.1897, -43.4049

# Details

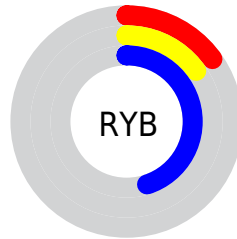
The CIELCh color **20, 50.845, 300.348** is a dark color, and the websafe version is hex **333399**. A complement of this color would be **47, 41.878, 104.322**, and the grayscale version is **19, 0.004, 296.813**.

A 20% lighter version of the original color is **40, 51.129, 300.455**, and **3, 45.137, 302.173** is the 20% darker color. If you saturate the color by 10%, you get **16, 58.912, 302.441**, and if you desaturate by 10%, it is **24, 42.554, 298.269**.

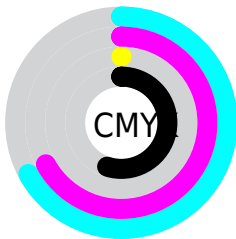
# Distribution



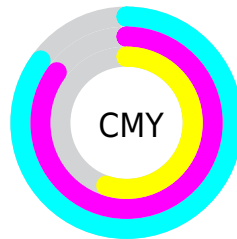
- Red (15%)
- Green (15%)
- Blue (45%)



- Red (15%)
- Yellow (15%)
- Blue (45%)



- Cyan (67%)
- Magenta (67%)
- Yellow (0%)
- Black (55%)




- Cyan (85%)
- Magenta (85%)
- Yellow (55%)


# Brightness & Saturation Gradients

These gradients show how the CIELCh color 20, 50.845, 300.348 changes by changing the brightness by 10 percent. The first figure shows a shift by +10% for each color and the second figure -10%.


Similar to the brightness gradients but the following saturation gradients show a change of the CIELCh color 20, 50.845, 300.348 by changing the saturation by 10% instead.



 20, 50.845,  
300.348

 20, 50.845,  
300.348

 100, 50.845,  
300.348

 10, 50.845,  
300.348


 40, 50.845,  
300.348

 0, 50.845, 300.348

 50, 50.845,  
300.348

 60, 50.845,  
300.348

 70, 50.845,  
300.348

 80, 50.845,  
300.348

 90, 50.845,

300.348

■ 20, 50.845,  
300.348

■ 20, 50.845,  
300.348

■ 16, 58.912,  
302.441

■ 24, 42.554,  
298.269

■ 14, 66.034,  
304.299

■ 28, 34.396,  
296.345

■ 11, 71.751,  
305.770

■ 32, 26.508,  
294.637

■ 11, 73.703,  
306.265

■ 37, 18.926,  
293.154

■ 41, 11.644,  
291.881

■ 45, 4.645, 290.798

■ 49, 2.092, 109.838

■ 53, 8.587, 109.057

■ 58, 14.855,  
108.375

# Harmonies

# Complementary

The Complementary color scheme is a pair of colors which are on the opposite of each other on the color wheel.



20, 50.845, 300.348



47, 41.878, 104.322

# Rectangle

The Rectangle color scheme consists of four colors that form a rectangle on the color wheel.



20, 50.845, 300.348



20, 50.845, 350.348



20, 50.845, 120.348



20, 50.845, 170.348

# Sweetspot

The Sweet Spot groups the original color and five complimentary colors.



20, 50.845, 300.349



51, 17.267, 292.326



44, 23.819, 194.921



24, 11.754, 292.597



81, 0.010, 296.813



31, 0.005, 296.813





# Same Dimension

The Same Dimension uses a secret algorithm to generate beautiful new colors.



20, 50.845, 300.349



21, 75.926, 303.462



24, 50.217, 311.753



21, 3.788, 291.015



12, 76.506, 306.266



31, 130.721, 306.278



# Inverse Universe

The Inverse Universe completely reimagines the original color for something new.



27, 38.110, 28.391



32, 57.302, 33.147



44, 45.402, 125.769



22, 2.649, 19.773



24, 57.972, 37.749

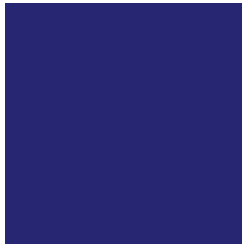


52, 102.147, 39.970



# Previews

## White Background



This preview shows how the CIE LCh color 20, 50.845, 300.348 looks on a white background.

## Color Contrast Check

Large Text (above 18pt) WCAG AA ✓ Pass

Any Text WCAG AA ✓ Pass

Large Text (above 18pt) WCAG AAA ✓ Pass

Any Text WCAG AAA ✓ Pass

# Black Background



This preview shows how the CIE LCh color 20, 50.845, 300.348 looks on a black background.

## Color Contrast Check

Large Text (above 18pt) WCAG AA × Fail

Any Text WCAG AA × Fail

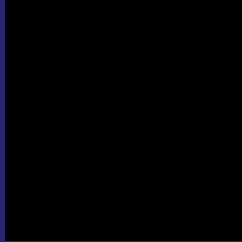
Large Text (above 18pt) WCAG AAA × Fail

Any Text WCAG AAA × Fail

If you want to check with other color combinations, try the [Color Contrast Checker](#).

**CIELCh 20, 50.845, 300.348**

## **Background**



This preview shows how black text looks on a background with the CIELCh color 20, 50.845, 300.348.



This preview shows how white text looks on a background with the CIELCh color 20, 50.845, 300.348.

# Color Blindness Simulation

Color vision deficiency is a very complex topic, and I could not describe the different causes any better than Wikipedia does, so if you want to learn more, you should check out their [article about color blindness](#).

## Dichromacy



### Original Color

20, 50.845, 300.348

### Protanopia

20, 35.728, 283.574

### Tritanopia

20, 16.157, 206.447



# Trichromacy



**Original Color**  
20, 50.845, 300.348

**Protanomaly**  
20, 40.757, 290.237

**Tritanomaly**  
19, 21.934, 269.621

# Monochromacy



**Original Color**  
20, 50.845, 300.348

**Achromatopsia**  
19, 0.004, 296.813

**Achromatomaly**  
19, 19.240, 294.699

# CSS Examples

## Text

The CSS property to change the color of the text to CIELCh 20, 50.845, 300.348 is called "color". The color property can be set on classes, ids or directly on the HTML element.

This example shows how text in the color `rgb(38, 38, 114)` looks like.

```
.text, #text, p{  
    color:rgb(38, 38, 114)  
}
```

If you want to add a text shadow in that color use the text-shadow property, you can generate a text shadow directly with our [CSS Text Shadow Generator](#).

Here you see how black text with a 4 pixel rgb(38, 38, 114) colored shadow looks like.

```
.shadow{ text-shadow: 4px 4px 2px rgb(38, 38, 114) }
```

## Border

The CSS property to change the border of an element to CIELCh 20, 50.845, 300.348 is called "border". The border property can be set on classes, ids or directly on the HTML element.

This example shows the color as border, it can be applied via the CSS property "border" or "border-color".

```
.border, #border, table{ border:4px solid rgb(38, 38, 114) }
```

If only the border color should be changed use the property border-color.

```
.border{ border-color:rgb(38, 38, 114) }
```

If you want to add a box shadow in that color use:

Here you see how a box with a 4 pixel rgb(38, 38, 114) colored shadow looks like.

```
.boxshadow{ -moz-box-shadow:4px 4px 4px  
4px rgb(38, 38, 114); -webkit-box-  
shadow:4px 4px 4px 4px rgb(38, 38, 114);  
box-shadow:4px 4px 4px 4px rgb(38, 38,  
114) }
```

# Background

The CSS property to change the background color of an element to CIELCh 20, 50.845, 300.348 is called "background". The background property can be set on classes, ids or directly on the HTML element.

```
.background, #background, body{  
background: rgb(38, 38, 114) }
```

If only the background color should be changed can be used:

```
.background{ background-color: rgb(38, 38,  
114) }
```

This example shows the color as background, it is applied via the CSS property "background".

To optimize and compress your CSS code, you can use our [online CSS compressor and optimizer](#) based on csstidy. If you want to create a linear or radial gradient as background or border, check our [CSS Gradient Generator](#).

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